

AMENDMENTS TO THE CLAIMS

The following listing of claims will replace all prior versions and listings of claims in the application.

LISTING OF CLAIMS

1 - 20. (Canceled)

21. (currently amended) A vehicle driveline component comprising:
a housing defining a chamber;
a power transfer mechanism having a shaft, the shaft being supported for rotation by the housing and extending outwardly from the housing; and
a wheel coupled to the shaft for rotation therewith, the wheel including a leading surface and a trailing surface, the wheel defining a duct that extends through the leading surface and the trailing surface, the duct having an inlet at the leading surface and an outlet at the trailing surface with a cross-sectional area of the inlet greater than a cross-sectional area of the outlet, the duct being adapted to draw air therethrough when the wheel is rotated.

22. (previously presented) The vehicle driveline component of Claim 21, wherein the power transfer mechanism includes a differential.

23. (previously presented) The vehicle driveline component of Claim 22, wherein the shaft is an input pinion.

24. (currently amended)) The vehicle driveline component of Claim 21, wherein ~~the duct includes an inlet that is located at the leading surface and wherein~~ the inlet of the duct has a generally triangular shape.

25. (currently amended) The vehicle driveline component of Claim 24, wherein ~~the duct includes an outlet that is located at the trailing surface and wherein~~ the outlet of the duct has a generally rectangular shape.

26. (withdrawn) The vehicle driveline component of Claim 21, wherein the duct includes an inlet that is located at the leading surface and wherein the inlet has a generally oval shape.

27. (withdrawn) The vehicle driveline component of Claim 26, wherein the duct includes an outlet that is located at the trailing surface and wherein the outlet has a generally circular shape.

28. (cancelled)

29. (previously presented) The vehicle driveline component of Claim 21, wherein the wheel includes an outer peripheral surface and wherein the duct lies radially inward of the outer peripheral surface.

30. (previously presented) The vehicle driveline component of Claim 21, wherein the wheel is disk shaped.

31. (previously presented) A vehicle driveline component comprising:
an axle housing defining a chamber;
a differential mounted to the housing for rotation in the chamber about a first axis, the differential including a ring gear;
an input pinion shaft mounted to the housing for rotation about a second axis that is generally perpendicular to the first axis, the input pinion shaft including a pinion gear, which is meshingly engaged to the ring gear, and a shaft member that extends from the housing;
a yoke member coupled to the shaft member, the yoke member being adapted for coupling the input pinion shaft to a propeller shaft; and
a wheel that is coupled for rotation with the shaft member and disposed between the pinion gear and the yoke member, the wheel including a leading surface and a trailing surface, the wheel defining a duct that extends through the leading surface and the trailing surface, the duct being adapted to draw air therethrough when the wheel is rotated.

32. (previously presented) The vehicle driveline component of Claim 31, wherein the duct includes an inlet at the leading surface and an outlet at the trailing surface and wherein a cross-sectional area of the inlet is greater than a cross-sectional area of the outlet.

33. (previously presented) The vehicle driveline component of Claim 31, wherein the duct includes an inlet at the leading surface and an outlet at the trailing surface and wherein a cross-sectional area of the duct varies continuously between the inlet and the outlet.

34. (previously presented) The vehicle driveline component of Claim 31, wherein the duct is symmetric about a duct centerline.

35. (previously presented) The vehicle driveline component of Claim 31, wherein the wheel includes an outer peripheral surface and wherein the duct lies radially inward of the outer peripheral surface.

36. (previously presented) The vehicle driveline component of Claim 31, wherein the duct includes an inlet at the leading surface, the inlet being disposed in a plane that is generally perpendicular to the second axis.

37. (previously presented) The vehicle driveline component of Claim 31, wherein the duct includes an outlet at the trailing surface, the outlet being disposed in a plane that is generally perpendicular to the second axis.

38. (new) A vehicle driveline component comprising:

a housing defining a chamber;

a power transfer mechanism having a ring gear supported in the chamber for rotation about a first axis, a pinion gear meshed with the ring gear and supported in the chamber for rotation about a second axis, and a shaft fixed for rotation with the pinion gear that extends from the housing:

a yoke member coupled to the shaft and adapted for connection to a propeller shaft; and

a wheel fixed for rotation with the shaft and disposed between the housing and the yoke member, the wheel defining a leading surface and a trailing surface with a duct extending therebetween that is adapted to draw air therethrough when the wheel is rotated.

39. (new) The vehicle driveline component of Claim 38, wherein the duct includes an inlet at the leading surface and an outlet at the trailing surface and wherein a cross-sectional area of the inlet is greater than a cross-sectional area of the outlet.

40. (new) The vehicle driveline component of Claim 38, wherein the duct includes an inlet at the leading surface and an outlet at the trailing surface and wherein a cross-sectional area of the duct varies continuously between the inlet and the outlet.

41. (new) The vehicle driveline component of Claim 38, wherein the duct is symmetric about a duct centerline.

42. (new) The vehicle driveline component of Claim 38, wherein the wheel includes an outer peripheral surface and wherein the duct lies radially inward of the outer peripheral surface.

43. (new) The vehicle driveline component of Claim 38, wherein the duct includes an inlet at the leading surface, the inlet being disposed in a plane that is generally perpendicular to the second axis.

44. (new) The vehicle driveline component of Claim 38, wherein the duct includes an outlet at the trailing surface, the outlet being disposed in a plane that is generally perpendicular to the second axis.

45. (new) A vehicle driveline component, comprising:
a housing defining a chamber;
a power transfer mechanism having a pinion shaft with a pinion gear supported for rotation within the chamber and a shaft member extending outwardly from the housing;
a yoke member coupled to the shaft member; and
a wheel fixed for common rotation with the shaft member and disposed between the housing and the yoke member, the wheel including a leading surface and a trailing surface with a duct extending therebetween such that the duct draws air toward the housing when the wheel is rotated.

46. (new) The vehicle driveline component of Claim 45, wherein the duct includes an inlet at the leading surface and an outlet at the trailing surface and wherein a cross-sectional area of the inlet is greater than a cross-sectional area of the outlet.

47. (new) The vehicle driveline component of Claim 45, wherein the duct includes an inlet at the leading surface and an outlet at the trailing surface and wherein a cross-sectional area of the duct varies continuously between the inlet and the outlet.

48. (new) The vehicle driveline component of Claim 45, wherein the duct is symmetric about a duct centerline.